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ABSTRACT

The theoretical framework of Abraham Maslow espouses a holistic view of the human being in which individuals have universal tendencies to strive to satisfy physiological, sociological, and psychological needs as these need states become more or less predominant in their lives. The potency of need fulfillment, the extent of gratification of psychological needs, is assumed to be indicative of job motivation, i.e., the lower need fulfillment deficiency, the higher the organizational or professional motivation, or conversely, the higher the need fulfillment deficiency, the lower the organizational or professional motivation. To determine the potency of need fulfillment deficiencies among educators and the extent to which educators differ in need fulfillment deficiencies, the following question was posited: Are there significant differences in need fulfillment deficiencies of teachers and administrators, male and female educators, white and non-white educators, and educators who are aspirants and those who are non-aspirants to promotional positions in educational organizations? Subjects were 728 educators from the southwestern part of the United States who completed the Porter Need Satisfaction Questionnaire. By sex, males were most deficient in esteem needs and females most deficient in autonomy needs. By race, whites were most deficient in esteem needs, while non-whites were most deficient in security needs. By position, administrators were relatively stronger in job motivations and most deficient in self-actualization needs. Teachers were most deficient in esteem needs. Both aspirants and non-aspirants were deficient in esteem needs. (Author)

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Job Motivation and the Need Fulfillment Deficiencies of Educators

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The basic premises of this study are grounded in the theoretical framework of Abraham Maslow (1943, 1949, 1968, 1970). He espouses a holistic view of the human being; i.e., individuals have universal tendencies to strive to satisfy physiological, sociological, and psychological needs as these need states become more or less prepotent in ones' life. These needs, be they material, interpersonal, or transcendent might be manifested as striving for health, autonomy, excellence, or they may emerge as "regressive, fearful, self-diminishing tendencies" (1970).

Maslow structured his theory of human motivation on a hierarchical arrangement of human needs, ranging from lowest to highest, and postulated that the lower order needs must be fairly well satisfied before the higher order needs appear. The potency of each need was presumed to be greatest at the time it appears, thus the individual becomes motivated to satisfy it. According to Maslow, the five basic prepotent needs include: (1) physiological (physical) needs, (2) safety (security) needs, (3) love and belonginess (social) needs, (4) esteem needs, and (5) self-actualization needs.

Maslow describes each need category as follows:

Physiological. The basic human needs or drives in the need structure are those that are considered essential to the existence of the organism. Maslow (1970) believed that these needs -- hunger, thirst, sex, shelter -- are relatively independent of each other and of other motivations.

> Undoubtedly these physiological needs are the most prepotent of all needs. What this means specifically is that in the human being who is missing everything in life in an extreme fashion, it is most likely that the major motivation would be the physiological needs rather than any others. A person who is lacking food, safety, love, and esteem would most probably hunger for food more strongly than for anything else (p. 37).

When physiological needs are satisfied, man's behavior is then controlled by the next higher level.

Safety. Safety needs (security; stability; dependency; protection; freedom from fear; freedom from anxiety and chaos; need for structure, order, law, and limits; strength in the protector) assume considerable importance in the organizational setting. A person in this state, if it is extreme enough and chronic enough, may be characterized as living almost for safety alone (Maslow, 1970, p. 39). Such security measures as tenure, pension, and regular salary increments may be strong motivators for educators in educational organizations.

Belongingness and love. As the safety needs are satisfied, the social needs for belongingness and love emerge. These include the needs for association, acceptance by colleagues, and giving and receiving friendship. If the social needs for acceptance are thwarted, one tends to behave in a way that is detrimental to the achievement of organizational goals.

Esteem. The esteem needs are considered to be egoistic needs and are of two kinds: (1) the desire for strength, achievement, adequacy, mastery and competence, confidence to face the world, and independence and freedom; (2) the desire for reputation or prestige

(defined as respect or esteem from other people), status, fame and glory, dominance, recognition, attention, importance, dignity, and appreciation (Maslow, 1970, p. 45).

When the esteem needs are satisfied, feelings of self-confidence, self-worth, strength, and usefulness to others emerge. When these needs are thwarted, feelings of negative self-concept, inferiority, and weakness develop.

Self-actualization. Self-actualization is the apex of the hierarchy, which refers to an individual's desire for self-fulfillment. As each individual recognizes his or her full potential, there then is the desire to become all that one is capable of becoming. According to Maslow (1970), "The clear emergence of these needs usually rests upon some prior satisfaction of the physiological, safety, love, and esteem needs" (p. 46). It is in the self-actualization need that individual differences are greatest, because there is wide variation from one person to another in the expression of this need.

From his theory, Maslow framed three basic hypotheses:

1. There is a hierarchical arrangement of human needs and as the lower order need is fairly well satisfied, the next need in the hierarchy becomes prepotent.
2. As the lower order needs -- physiological and security -- become satisfied, they cease to motivate an individual. For example, when one's hunger and thirst needs are satiated, one is not motivated to continue seeking food and water.
3. As self-actualization needs are satisfied they continue to motivate individuals for sustenance and for increase of that satisfaction.

It might seem that the Maslow theory suggests complete fulfillment of a lower order need before the next higher order need emerges and that human needs emerge in a fixed order; this, however, is not always the case. None of the needs is 100 percent fulfilled, and they do not always emerge in the theorized hierarchical order. For example, Maslow postulated that:

> the average citizen is satisfied perhaps 85 percent in his physiological needs, 70 percent in his safety needs, 50 percent in his love needs, 40 percent in his self-actualization needs (p. 54).

The appearance of needs is not a sudden event, but rather a gradual emergence of a new need when the existing one is fairly well satisfied. Lawler asserts that Maslow's theory can be used to predict

> a dynamic, step by step, causal process of human motivation in which behavior is governed by a continuously changing (though predictable) set of 'important' needs. An increase (change) in the satisfaction of the needs in one category causes the strength of these needs to decrease which results in an increase in importance of the needs at the next higher level (1973, pp. 28-29).

The five need categories of Maslow have been applied to educational settings as follows. Security, the lowest order need, is associated with money, benefits, tenure, and role consolidation. Social need is associated with acceptance, belonging, friendship, school membership, formal work group, and informal work group relationships. Self-esteem is associated with self-respect, respect by others as a person and as a professional, competence, confidence and recognition. Autonomy is associated with control, influence participation, and authority. Self-actualization is associated with personal and professional success, achievement,

peak satisfaction, giving all and working at top potential (Sergiovanni and Elliott, 1975, p. 142).

Numerous studies have been conducted to ascertain the validity of Maslow's theory and to make application of its basic concepts to workers in various types of organizational settings. Porter (1961) developed a scale (the Porter Needs Satisfaction Questionnaire - PNSQ) that was based on Maslow's theory and, in a series of studies (1961, 1962, 1963, 1963), used it to ascertain the existence of and differences in perceived psychological needs of employees in industrial organizations. Using industrial managers as subjects, Porter (1961) found and concluded that (a) the greatest differences in need fulfillment deficiencies between bottom and middle management personnel were in the security, esteem, and autonomy need areas, (b) higher order psychological needs (autonomy and self-actualization) were relatively higher among bottom and middle management personnel than were their lower order needs, and (c) one's management position (bottom or middle management) appears to be an important variable in determining the extent to which psychological needs are fulfilled. In 1962, Porter extended the scope of the previous study to include nearly 2000 managers and found that the results of this study were generally consistent with the findings of his earlier study; i.e., lower management personnel had greater need deficiencies than upper level management personnel.

In a later study, Porter (1963), also, found that lower level management personnel in small companies had relatively smaller need deficiencies than large company managers; but at higher levels of management, large company managers had relatively smaller need

deficiencies than small company managers. In the last study of the series, Porter (1963a) found that line managers had relatively larger perceived need fulfillment deficiencies than staff managers especially in the esteem and self-actualization areas, and that the horizontal position variable (line vs. staff) had relatively less effect on need fulfillment deficiency scores than did the vertical position variable (bottom, middle, and top) within the management hierarchy.

Slocum and Topichak (1972) administered the Porter Scale to blue-collar workers in the same company which had locations in Mexico and the United States in order to assess the impact of culture on perceived need fulfillment deficiencies. They found that Mexican employees had relatively smaller need deficiencies than their American counterparts; however, the authors pointed out that their research contained several methodological limitations.

Trusty and Sergiovanni (1966) administered the Porter Scale to teachers and administrators in one school district. They found that educators have perceived psychological needs which vary according to their professional role (administrators and teachers - secondary, Jr. High, and elementary), age, and sex.

Each of these studies, has been useful in testing Maslow s concepts. Essentially, they have reported findings that are consistent with the basic tenets of the theory.

The need hierarchy framework has also been used to explicate factors related to job motivation.

"The question of motivation is a question of what makes us do the things we do. Psychologists agree that actions and thoughts of human beings center on meeting their needs, which arise from within

themselves or from their environment" (Misner, Schneider and Keith, 1963, p. 113). That is, what are the basic needs of educators that make them think and act as they do?

Wolf (1970) contends that "job motivation can be considered as a subclassification of general motivation; as such, it follows the principles of the need hierarchy (Maslow) . . . . Job motivation occurs when an individual perceives an opportunity to gratify an active need through job related behaviors.

In terms of the foregoing, an individual's motivation to satisfy changing need states may be a primary influence on his or her job motivation. Additional factors such as sex, race, professional position and aspiration may also influence one's job motivation.

The potency of need fulfillment -- the extent of gratification psychological needs -- is assumed to be indicative of job motivation, i.e., the lower need fulfillment deficiency, the higher the organizational or professional motivation; or conversely, the higher the need fulfillment deficiency, the lower the organizational or professional motivation. In this study the researchers sought to determine (a) the potency of need fulfillment deficiencies among educators, and (b) the extent to which educators differ in need fulfillment deficiencies. The following question was posited: Is there a significant difference in need fulfillment deficiencies of (1) teachers and administrators, (2) male and female educators, (3) white and non-white educators, and (4) educators who are aspirants and those who are non-aspirants to promotional positions in educational organizations?

Methodology

Population and Sample

This study was based on the responses of 728 educators, from six independent school districts located in the southwestern part of the United States, to items on the Porter Need Satisfaction Questionnaire (PNSQ). Using a table of random numbers, six school districts from among the 81 districts within an Educational Regional Service Center were asked to participate in the study. Within each of the six selected districts, a random selection of six schools was conducted from which the sample, teachers and administrators, was drawn. The PNSQ was administered to 1080 subjects from the 36 randomly selected schools of which 728 of the returns were useable.

Instrumentation

The Porter Need Satisfaction Questionnaire, originally developed for use in industrial settings, was adapted for use in educational settings by F. Trusty and T. Sergiovanni (1966). Specifically, this instrument purports to assess need deficiencies of respondents that correspond to Maslow's hierarchial need classification. Porter makes a distinction from Maslow in his need categories by eliminating the physiological need and adding an autonomy need category to his instrument. Based on the assumption that managers (respondents for whom the instrument was originally designed) are most likely to have gratified, the basic physiological need for food, clothing, and shelter Porter assumed these needs were fairly well satisfied among persons of the managerial level.

Porter included an "autonomy category" (between esteem and self-actualization) which seems to be implied in the classification system of Maslow and which is an important concept in the assessment of motivational behavior in organizations.

Listed below are sample items from the PNSQ. Respondents were provided 13 job related statements and were asked to indicate on a scale from 1 - 7 (1 representing low with 7 representing high need deficiencies) the extent to which they perceived a particular job related characteristic in their present school position. Respondents were to indicate

(a) How much is there now? 1 2 3 4 5 6 7

and (b) How much should there be? 1 2 3 4 5 6 7 regarding such statements as: The opportunity to develop close friendships in my professional position.

The prestige of my professional position.

Discrepancies between responses to a and b above were calculated to yield a need fulfillment deficiency score for each item. Discrepancy scores within a given need category were then summed; hence, the larger the summed discrepancy score, the greater was deemed the perceived need fulfillment deficiency; as conversely; the smaller summed discrepancy score, the less was deemed the perceive need fulfillment deficiency.. The range of scores in each need category was as follows: security 0 - 6, social 0 - 12, esteem 0 - 18, autonomy 0 - 24, self actualization 0 - 18 points.

Data Analysis

To answer the general research question of prepotency of needs, data were analyzed by calculating the means and standard deviations of scores on responses to items that assessed each of the need categories. To answer the questions of difference, two series of 2x2x2 factorial analyses of variance designs were utilized: one using the variables sex, race and position; the other using the variables sex, race and aspiration as independent variables. These analyses enabled the researchers to investigate main effects and interactional effects of the independent variables on the dependent variable that would explain the difference between groupings of respondents in each of the need categories (the dependent variables).

F ratios were computed to determine if there were significant differences in main effects and/or significant interactional effects. A $p < .05$ chance of occurrence was used as the criterion for determining the significance of results.

Results

Potency of Need Fulfillment Deficiency

The initial analysis of data was designed to ascertain the potency of need fulfillment deficiencies (measures of educators' job motivation) among the respondents across each category of psychological need and within each group of respondents. Each of the five psychological need categories was comprised of one or more items on the Porter Needs Satisfaction Questionnaire; and since the mean need deficiency scores of each item of a particular need

category were summed, each of the summed mean need fulfillment deficiency scores of the respondents was transformed into "mean percent of need deficiency scores." This was accomplished by dividing each of the mean need fulfillment deficiency scores by the highest possible need fulfillment deficiency score for that category of psychological need. For example, a mean security need fulfillment deficiency score of 1.39 was divided by 6.0 (the highest possible need deficiency score for security) which yielded a percent of 23.2; a mean need fulfillment deficiency score of 5.54 in the autonomy need category was divided by 24 (the highest possible need fulfillment deficiency score for autonomy needs) yielded a percent of 23.1, etc. The following scale was developed to arbitrarily indicate the potency of need fulfillment deficiency, the converse of which would be a measure of one's job motivation.

Need Deficiency	0	25%	50%	75%	100%
Job Motivation	Very Strong	Strong	Moderate	Weak	

Figure 1. Potency of Job Motivation

Using the above scale, each of the mean need deficiency scores could be compared to each other; i.e., the potency of need fulfillment deficiency for each group of respondents could be ascertained. The mean need fulfillment deficiency scores found in Table 1, labeled "percentage of Need Deficiency" contain these data for each category of need.

An inspection of the mean need fulfillment deficiency scores (see Table 1) for each category of need, grouped by sex, race, role, and aspiration shows that:

1. security needs were least deficient among administrators (.59) and most deficient among nonwhite educators (1.59)
2. social needs were least deficient among administrators (1.07) and were most deficient among aspirants (1.65)
3. esteem needs were least deficient among administrators (2.19) and most deficient among aspirants (4.96)
4. autonomy needs were least deficient among administrators (3.22) and most deficient among aspirants (6.45)
5. self-actualization needs were least deficient among administrators (2.67) and most deficient among aspirants to higher positions (4.42).

An inspection of the data using the "mean percent of need fulfillment deficiency" for the respondents grouped by sex, race, role and aspiration for each category of need shows that all respondents' needs ranged from 9.8 percent (very strong job motivation) to 27.6 percent (strong job motivation). More specifically, inspection of mean percents showed that:

1. by sex, male respondents were most deficient in esteem needs followed by their security, autonomy, self-actualization, and social needs respectively; female respondents were most deficient in their autonomy needs followed by their esteem, self-actualization, security, and social needs respectively
2. by race, white respondents were most deficient in esteem needs followed by their autonomy, self-actualization, security, and social needs respectively; non-white respondents were most deficient in

Table 1

Mean Score on Need Fulfillment Deficiencies
Sex by Race by Position
by Aspiration

Needs	Sex				Race				Position				Aspiration					
	Male		Female		White		NonWhite		Administrative		Teacher		Aspirant		Non-Aspirant		Total	
	N=194		N=534		N=612		N=116		N=58		N=670		N=285		N=443		N=728	
	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ	$\bar{X}$	σ
Security	1.39	1.65	1.20	1.47	1.18	1.47	1.59	1.73	.59	1.04	1.31	1.54	1.40	1.61	1.15	1.45	1.25	1.52
Percent of Need Deficiency	23.2%		20.0%		19.7%		26.5%		9.8%		21.8%		23.3%		19.2%		20.8%	
Social	1.63	1.96	1.42	1.74	1.47	1.77	1.53	1.98	1.07	1.37	1.51	1.83	1.65	1.95	1.37	1.70	1.48	1.80
Percent of Need Deficiency	13.6%		11.8%		12.3%		12.8%		8.9%		12.6%		13.8%		11.4%		12.3%	
Esteem	4.53	3.87	4.42	3.56	4.67	3.66	3.28	3.36	2.19	2.07	4.64	3.68	4.96	3.88	4.12	3.44	4.45	3.64
Percent of Need Deficiency	25.2%		24.6%		25.9%		18.2%		12.2%		25.8%		27.6%		22.9%		24.8%	
Autonomy	5.54	4.99	5.96	4.67	6.00	4.71	5.07	4.93	3.22	3.27	6.07	4.80	6.45	4.96	5.46	4.59	5.85	4.76
Percent of Need Deficiency	23.1%		24.8%		25.0%		21.1%		13.4%		25.3%		26.9%		22.8%		24.4%	
Self-Actualization	3.83	3.35	3.89	3.18	4.00	3.20	3.16	3.31	2.67	2.45	3.98	3.27	4.42	3.36	3.52	3.09	3.87	3.23
Percent of Need Deficiency	21.3%		21.6%		22.2%		17.6%		14.8%		22.1%		24.6%		19.6%		21.5%	

security needs followed by autonomy, esteem, self-actualization, and social needs respectively

3. by position, administrator respondents were relatively stronger in their job motivations than any other group of respondents. Their self-actualization needs were most deficient followed by their autonomy, esteem, security, and social needs respectively; teacher respondents were most deficient in their esteem needs followed by autonomy, self-actualization, security, and social needs respectively.

4. by aspiration, aspirants to promotional positions were most deficient in esteem followed by their autonomy, self-actualization, security, and social needs; non-aspirants were most deficient in esteem needs followed by their autonomy, self-actualization, security, and social needs respectively.

Factorial Design: Sex x Race x Position

For each of the need categories a three dimensional factorial analysis of variance was conducted. Results of each are presented below.

Using the security need as the dependent variable, it was found that there were significant differences by race in the need fulfillment deficiencies of educators. Results of the Fisher t test indicate non-whites are significantly more deficient in the fulfillment of their security needs than are whites. Significant first order interactions appear between sex and position, F (1,720) = 4.83, $p < .05$ and between race and position, F (1,720) = 5.22, $p < .05$. These interactions suggest that the differences in educators' security needs are dependent on the simultaneous effect of their

sex and position as well as on their race and position. Hence, on the measure of security need fulfillment deficiency, one of the main effects comparisons and two of the first order comparisons of group means were significant.

None of the F ratios using the three dimensional ANOVA were found to be significant in their effects on the social needs of educators. Educators do not differ significantly by sex, race, or position in their social need fulfillment deficiencies.

The three dimensional ANOVA yielded a significant main effects F ratio in educators' esteem need deficiencies on only one of the independent variables, position, $F(1,720)=4.23$, $p < .05$. A significant Fisher t statistic indicated teachers reported significantly less satisfaction of their esteem needs than did administrators. None of the other main effects or first order interactions were significant.

Examination of the results of the three dimensional ANOVA revealed there were no significant differences in the main effects and in the first order interactions of independent variables on educators' need for autonomy. Educators in this study tend not to vary by sex, race, or position in their autonomy needs.

Like the social and autonomy need deficiencies, there were no significant main effects or first order differences in the respondents' need to be self-actualized. The level of perceived satisfaction of psychological needs is about the same for each of the groups in this study.

Factorial Design: Sex by Race by Aspiration

A second set of three dimensional analyses of variance was conducted to ascertain differences in the need fulfillment deficiencies of educators by sex, race and aspiration (aspirant or non aspirant to a promotional position in the educational system). Results of the analyses are presented below.

The test of significant differences in respondents' security need deficiencies yielded a significant F ratio on one of the variables, race, $F\ (1,720)=6.83$, $p < .01$. Results of the Fisher t test suggest that whites and non-whites differ significantly in their security needs; non-whites indicating higher need deficiencies than whites. No other main effects, first or second - order interactions were found to be significant.

There were no significant F ratios as a result of the three dimensional ANOVA when the social need fulfillment deficiency was used as the dependent variable. There was a tendency for educators in this study to be similar in their perceptions of the extent to which their social needs are fulfilled.

In the esteem need category, one of the F ratios reached a level of statistical significance; race, which was found to have a significant main effect difference, $F\ (1,720)=7.48$, $p < .01$. Results of the Fisher t indicated whites had greater esteem need deficiencies than non-whites. Other main effects, first order and second order interactions were non-significant.

Using autonomy needs as the dependent variable, results of the three-way ANOVA revealed no significant F ratios on main effects and on first and second order interactions. Respondents did not vary significantly in their need for autonomy.

Self-actualization needs were found to be significantly different in the effects of sex by aspiration interaction, $F(1,719)=6.09$, $p < .01$. The sex factor coupled with that of aspiration yielded a substantial difference in the need for self actualization. All other main effects, and first and second order interactions were found to be non-significant.

Discussion

When testing the significance of difference in educators' need deficiencies, using sex, race and position as independent variables, the need for security and the need for esteem were the two categories in which substantial differences were found. These findings suggest that factors of race as well as factors of position account for differences in the satisfaction of psychological needs in educational organizations. The main effects of race differences indicated educators do vary in their security needs; non-white respondents have greater security need deficiencies than do white respondents.

While such security factors as tenure, pension and salary increments are usually afforded to educators on an equitable basis differences in the security needs of whites and non-whites might be explained by the fact that whites predominate in superordinate positions (administration: N-52, white; N-6, nonwhite) in this study and in educational organizations in general. As such, whites are the power holders within the educational system. Persons in superordinate positions have the power to protect those whom they wish to protect from negative aspects of the job, they have the power to promote dependency or independency among workers as they see fit, they have the power to evoke fear or promote satisfaction among the workers in their performance of tasks. It could

be that non-white educators perceived a power structure that is impenetrable by them, thus, they are less secure about their role and/or status in the organization.

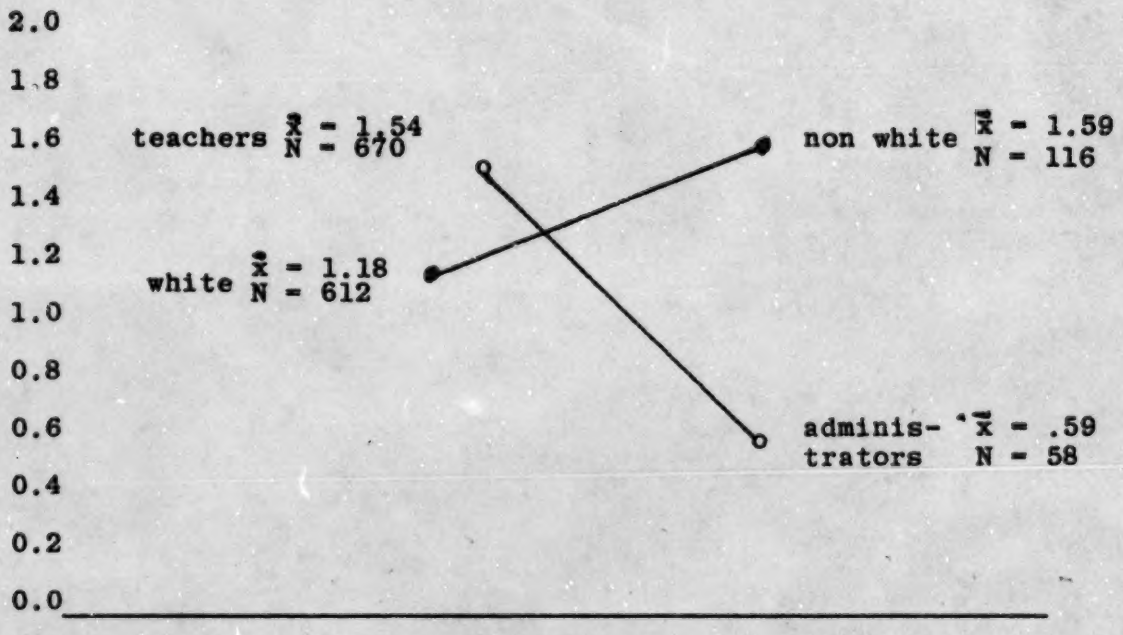
Of more importance is the interaction between race and position variables on security, represented in Figure 2. This interaction suggests that the effect of differences between whites and non-whites on security needs is dependent upon whether or not the educator is a teacher or an administrator. The fact that the mean values of educators' security needs change positions when assessed by race combined with position is indicative of the dependence of one variable on the other. In this case, race and position are not independent. While race alone contributes to the variance in security needs, an even greater amount of that variance is accounted for when race is combined with position.

The most logical explanation of the race by position interaction, however, is the fact that ninety percent of the administrators in this study are white and eighty four percent of the teachers sampled are white. The disproportionate numbers of respondents in the race and position groups obviously had some influence on the results.

Further assessment of differences in educators' security needs revealed an interaction between sex and position (see Figure 3). The interpretation of this interaction is similar to the race by position interaction, that is, security need deficiencies depend not only on whether one is a teacher or an administrator, but also on whether one is white or non-white. Again the disproportionate numbers in each group may have influenced the results that were obtained.

Figure 2

Security
Race by Position Interaction

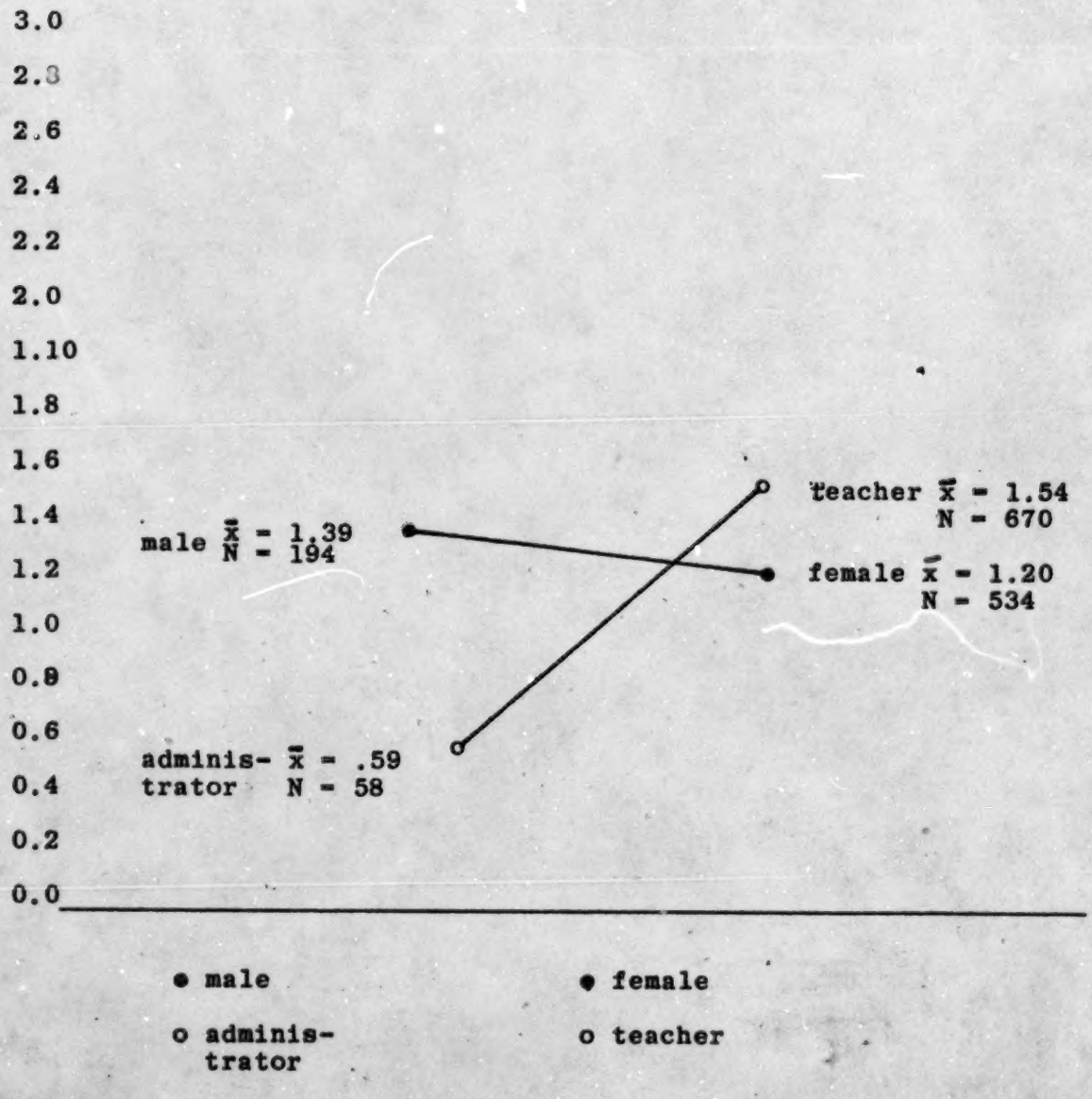


● white ● non white

o teacher o administrator

Figure 3

Security
Sex by Position Interaction



The respondents' esteem need deficiencies did vary on the basis of their position in the organization. Teachers reported a higher need for esteem than did administrators. This finding might be explained by the mere delineation of differences in perceptions (real and imagined) of rules and responsibilities. More often than not, it is the administrator who is afforded the opportunity to make decisions, give directives, provide guidance and support. The administrator functions in a superordinate capacity while the teacher functions in a subordinate capacity deriving little or no satisfaction from limited opportunities for creativity, innovativeness or independence.

Moreover, it is understandable that of the two role groups, in most educational organizations administrators are the most likely to have their egoistic needs met. The role of the administrator is usually associated with status, prestige, recognition and appreciation, while the teacher, more often than not, performs his or her tasks and they are given minimal respect, status and recognition for achievement. The administrator, as the educational leader, can structure the environment to meet his or her egoistic needs, while the teacher must function within the environment, for the most part, as it is structured by the administrator.

Respondents' perceptions of social, autonomy and self-actualization needs were not substantially different as related to their sex, race, position and aspirations. Any differences that were reported could only be ascribed to chance.

Like Porter's findings in his initial studies and Sergiovanni's findings in a later study, need deficiencies do vary according to

one's position in the organization. While perceived differences in social, autonomy and self actualization are attributed to chance, these need areas do function as motivators for each group as a whole.

In the second set of analyses, using sex by race by aspiration, differences in the main effects of race on security and of race on esteem needs provided the assessed variances in these categories. As in the first analysis, non-whites were higher than whites in their security needs, hence, the same explanation that was given in the first analysis would also apply in this instance.

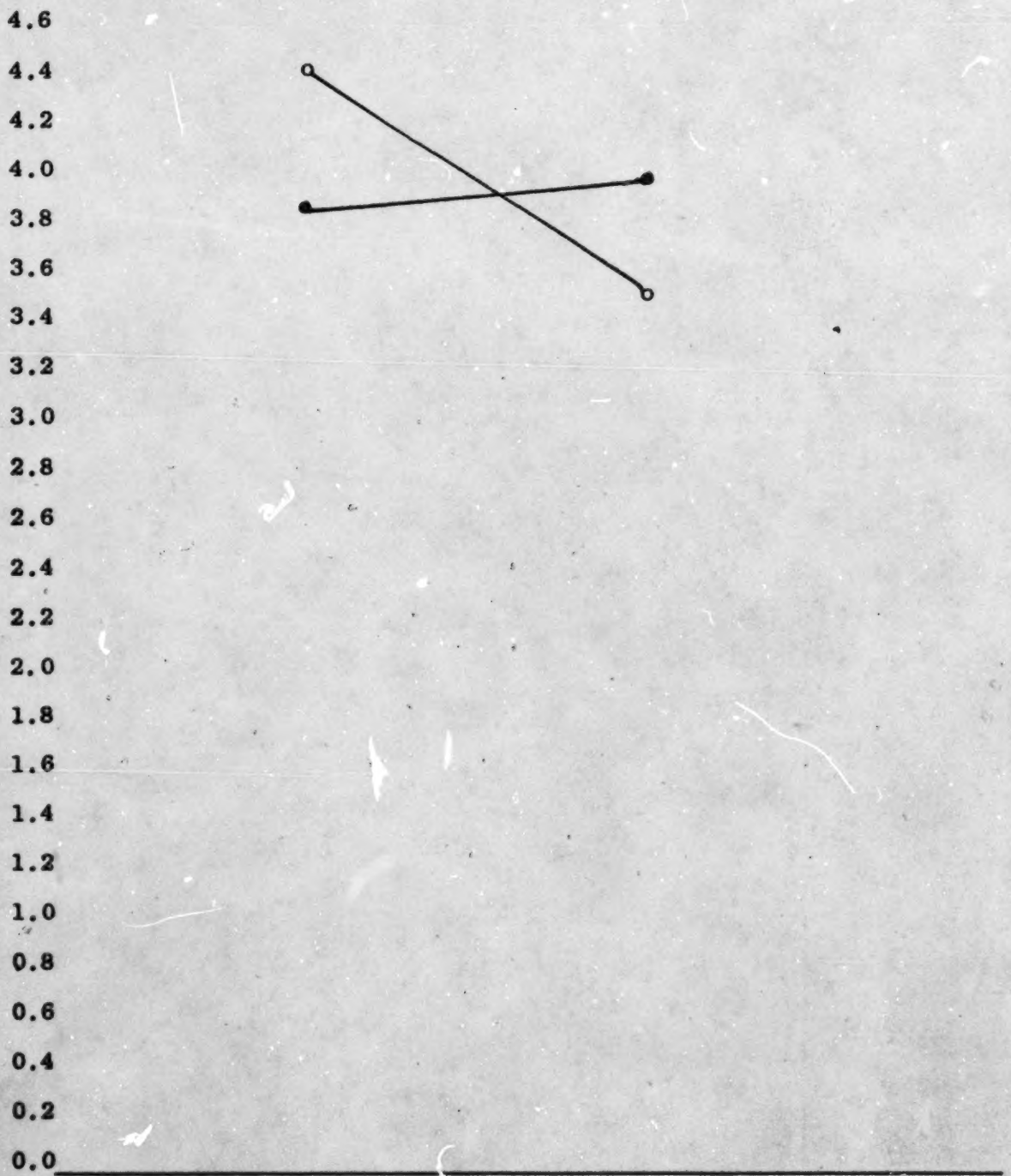
Unlike the first analysis where there were differences by position in esteem needs, in this analysis, differences by race in esteem needs were found. White respondents reported higher esteem need deficiencies than non white respondents.

On the basis of this finding it would seem that the white respondents evidenced higher deficiencies in the fulfillment of their desire for achievement, mastery, prestige and recognition. Their professional position does not provide experiences that would satisfy these needs to the same extent that non whites are satisfied. That is to say, non white respondents more than white respondents tend to derive more prestige, achievement, dignity appreciation and feelings of mastery from their professional position.

The interaction of sex by aspiration (see Figure 4) proved to be an interesting finding for neither of these variables alone offered a substantial measure of difference between the groups that were studied. Male and female respondents alone did not vary

Figure 4

Self Actualization
Sex by Aspiration



greatly in their need for self-actualization, neither did aspirants and non aspirants differ in their self-actualization needs. What did emerge, however, was an interdependence of these variables that is, the high need for self-actualization as perceived by aspirants, tended to be reduced in the level of need deficiency when assessed as females. Males and females reported differences in self-actualization needs only when considered as aspirants or non-aspirants.

In sum, then, results of the first analysis indicated race alone or in combination with position while sex in combination with position contributed to the variance in educators' security needs. Position, alone, contributed to the variance in respondents' esteem needs.

In the second analysis race contributed to the variance in respondents' security needs and in their esteem needs. Sex in combination with aspiration contributed to the variance in self actualization.

Summary and Recommendations

Using the potency of job motivation scale as a measure (see Figure 1) the job motivation of educators in this study ranged from very strong to strong. Because the potency of job satisfaction was greatest in the social needs, it seems that the educational organization, to a large extent, offers opportunities for collegial interaction and exchange and for giving and receiving friendship. The achievement of organizational goals can be promoted through the social milieu of the educational organization.

Esteem and autonomy were the need categories in which these educators were least motivated although the potency of job motivation was strong. What seems to be warranted is a continuing effort to offer recognition, status and opportunities for independence for teachers and administrators.

In a society that is becoming more and more complex, educational organizations are faced with growing demands to become more effective in their efforts to educate the populace. The extent to which educational organizations can be responsive to those demands may depend, in large part, on the motivation of educators to work. It is the responsibility of decision-makers at each level in the organizational hierarchy to provide organizational arrangements such that the physiological and psychological needs of educators can (or continue to) be gratified. Such arrangements might provide

- opportunities for professional and intellectual development
- a supportive climate that would be conducive to morale building and self-expression
- salaries and benefits that would enable educators to have economic stability and security
- encouragement and recognition in the accomplishment of tasks
- environments conducive to developing interpersonal relations and mutual respect for each other.

It behooves decision-makers who are in a position to effect change on behalf of administrators and teachers to identify the levels of prepotency at which educators as a group and as individuals are operating. The identification of need fulfillment deficiencies

can be essential to understanding organizational behavior, i.e., behaviors that are manifestations of job motivation.

When decision makers understand the needs individuals are seeking to gratify they can develop organizational goals and arrangements that would enhance their job motivation. Moreover, if decision makers are aware of the prepotency of educators' needs, they can better predict organizational behaviors and thus plan for working conditions that would assist in satisfying those needs. The identification and utilization of information concerning the need deficiency levels of educators can assist decision makers in their efforts to make informed judgements regarding which organizational arrangements are most appropriate to the establishment of optimum conditions for motivating educators to work.

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